

GenCore version 5.1.6  
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## OM protein - protein search, using sw model

Run on: December 21, 2004, 10:27:03 ; Search time 387 Seconds

(without alignments)  
498.380 Million cell updates/sec

Title: US-09-701-747A-2

Perfect score: 2892  
Sequence: 1 MPRIIVCKIKRFAEDAKPKK.....LPNHHHGHGPPGSLFENFAC 539Scoring table:  
BLASTN62  
Gapop 10.0 , Gapext 0.5

Searched: 1589859 seqs, 357834939 residues

Total number of hits satisfying chosen parameters: 1589859

Minimum DB seq length: 0

Maximum DB seq length: 2000000000

Post-processing: Minimum Match 0%  
Maximum Match 100%

Listing first 45 summaries

Database :

Published Applications AA:\*

- 1: /cgn2\_6/ptodata/2/pubpaa/US07\_PUBCOMB.pep.\*
- 2: /cgn2\_6/ptodata/2/pubpaa/PC1\_NEW\_PUB.pep.\*
- 3: /cgn2\_6/ptodata/2/pubpaa/US06\_NEW\_PUB.pep.\*
- 4: /cgn2\_6/ptodata/2/pubpaa/US06\_PUBCOMB.pep.\*
- 5: /cgn2\_6/ptodata/2/pubpaa/US07\_NEW\_PUB.pep.\*
- 6: /cgn2\_6/ptodata/2/pubpaa/PC1US\_PUBCOMB.pep.\*
- 7: /cgn2\_6/ptodata/2/pubpaa/US08\_NEW\_PUB.pep.\*
- 8: /cgn2\_6/ptodata/2/pubpaa/US08\_PUBCOMB.pep.\*
- 9: /cgn2\_6/ptodata/2/pubpaa/US09A\_PUBCOMB.pep.\*
- 10: /cgn2\_6/ptodata/2/pubpaa/US09C\_PUBCOMB.pep.\*
- 11: /cgn2\_6/ptodata/2/pubpaa/US09\_NEW\_PUB.pep.\*
- 12: /cgn2\_6/ptodata/2/pubpaa/US09\_NEW\_PUB.pep.\*
- 13: /cgn2\_6/ptodata/2/pubpaa/US10A\_PUBCOMB.pep.\*
- 14: /cgn2\_6/ptodata/2/pubpaa/US10B\_PUBCOMB.pep.\*
- 15: /cgn2\_6/ptodata/2/pubpaa/US10C\_PUBCOMB.pep.\*
- 16: /cgn2\_6/ptodata/2/pubpaa/US10D\_PUBCOMB.pep.\*
- 17: /cgn2\_6/ptodata/2/pubpaa/US10D\_NEW\_PUB.pep.\*
- 18: /cgn2\_6/ptodata/2/pubpaa/US11\_NEW\_PUB.pep.\*
- 19: /cgn2\_6/ptodata/2/pubpaa/US60\_NEW\_PUB.pep.\*
- 20: /cgn2\_6/ptodata/2/pubpaa/US60\_PUBCOMB.pep.\*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

## SUMMARIES

Result No.	Score	Query Match	Length	ID	Description
1	2811	97.2	539	US-09-772-180A-8	Sequence 8, Appl1
2	2811	97.2	539	US-10-295-027-290	Sequence 290, App
3	2799	96.8	539	US-09-772-180A-2	Sequence 2, Appl1
4	2571	88.9	587	US-09-772-180A-4	Sequence 4, Appl1
5	1275	44.1	526	US-09-983-204-13	Sequence 13, Appl1
6	1261	43.6	514	US-10-092-900A-104	Sequence 104, App
7	1236	42.7	574	US-10-789-241-18	Sequence 18, Appl
8	1236	42.7	574	US-10-757-262-134	Sequence 134, App
9	1198	41.4	533	US-10-258-073-8	Sequence 8, Appl1
10	1179	40.8	512	US-09-983-204-14	Sequence 14, Appl
11	1179	40.8	512	US-10-258-073-2	Sequence 2, Appl1
12	1179	40.8	512	US-10-258-073-6	Sequence 6, Appl1
13	1179	40.8	512	US-10-757-262-122	Sequence 122, App

14	1170	40.5	531	US-10-258-073-4	Sequence 4, Appl1
15	1155.5	40.3	531	US-10-345-680-56	Sequence 56, Appl
16	1165.5	40.3	531	US-10-366-288-44	Sequence 44, Appl
17	1165.5	40.3	549	US-09-983-204-6	Sequence 6, Appl1
18	1165	40.3	518	US-09-983-204-2	Sequence 2, Appl1
19	1139.5	39.4	518	US-09-983-204-4	Sequence 4, Appl1
20	510	17.6	150	US-09-860-670-108	Sequence 108, App
21	510	17.6	150	US-10-227-646-108	Sequence 108, App
22	466	16.1	103	US-09-772-180A-6	Sequence 6, Appl1
23	416	14.4	704	US-10-104-047-3501	Sequence 3501, Ap
24	413	14.3	669	US-09-983-204-15	Sequence 15, Appl
25	413	14.3	669	US-10-133-157-4	Sequence 4, Appl1
26	413	14.3	669	US-10-097-340-278	Sequence 278, App
27	413	14.3	669	US-10-097-340-280	Sequence 280, App
28	413	14.3	669	US-10-373-801-28	Sequence 28, Appl
29	413	14.3	669	US-10-133-573-4	Sequence 4, Appl1
30	413	14.3	669	US-10-741-601-466	Sequence 466, App
31	410	14.2	638	US-09-983-204-18	Sequence 18, Appl
32	410	14.2	638	US-10-133-157-8	Sequence 8, Appl1
33	410	14.2	638	US-10-133-573-8	Sequence 8, Appl1
34	401.5	13.9	640	US-10-133-157-5	Sequence 5, Appl1
35	401.5	13.9	640	US-10-133-573-5	Sequence 5, Appl1
36	397.5	13.7	649	US-09-983-204-16	Sequence 16, Appl
37	362	12.5	649	US-10-133-157-6	Sequence 6, Appl1
38	362	12.5	649	US-10-133-573-6	Sequence 6, Appl1
39	349	12.1	649	US-09-983-204-17	Sequence 17, Appl
40	316	10.9	515	US-09-983-204-19	Sequence 19, Appl
41	287	9.9	374	US-10-104-047-3578	Sequence 3578, Ap
42	252	8.7	555	US-10-168-651-27	Sequence 27, Appl
43	229.5	7.9	907	US-10-369-493-6677	Sequence 6677, Ap
44	176.5	6.1	114	US-10-106-698-6921	Sequence 6921, Ap
45	155.5	5.4	46	US-10-276-774-1604	Sequence 1604, Ap

## ALIGNMENTS

RESULT 1  
US-09-772-180A-8  
Sequence 8, Application US/09772180A  
Publication No. US20030027749A1  
GENERAL INFORMATION:  
APPLICANT: David C. Harrison  
APPLICANT: John Davis  
APPLICANT: Sharon Bingham  
APPLICANT: Trudy R. Doe  
APPLICANT: Simon Topp  
TITLE OR INVENTION: NOVEL COMPOUNDS  
FILE REFERENCE: GH-30021-C1  
CURRENT APPLICATION NUMBER: US/09/772,180A  
PRIOR FILING DATE: 2001-01-29  
PRIOR APPLICATION NUMBER: 09/063,848  
PRIOR FILING DATE: 1998-04-21  
PRIOR APPLICATION NUMBER: 9708936.1  
PRIOR FILING DATE: 1997-05-01  
PRIOR APPLICATION NUMBER: 97310289.0  
PRIOR FILING DATE: 1997-12-18  
PRIOR APPLICATION NUMBER: 9803566.0  
PRIOR FILING DATE: 1998-02-19  
NUMBER OF SEQ ID NOS: 8  
SOFTWARE: FastSeq for Windows Version 3.0  
SEQ ID NO 8  
LENGTH: 539  
TYPE: PRT  
ORGANISM: HOMO SAPIENS  
US-09-772-180A-8  
Query Match 97.2%; Score 2811; DB 10; Length 539;  
Best Local Similarity 97.0%; Pred. No. 2.4e-258;  
Matches 523; Conservative 6; Mismatches 10; Indels 0; Gaps 0;  
1 MPRIIVCKIKRFAEDAKPKKAGDPSLGAAGPAPDIAFFASTSLHGGRGCP 60  
|||||

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OM protein - protein search, using sw model

Run on: December 21, 2004, 09:55:38 ; Search time 24 Seconds  
(without alignments)  
1489.392 Million cell updates/sec

Title: US-09-701-747A-2  
Perfect score: 2992  
Sequence: 1 MPLEIVCKIKFAEDAKPKR.....LPNHHHPGPGSLFENFAC 539

Scoring table: BIOSUM62  
Gapop 10.0 , Gapext 0.5

Searched: 478139 seqs, 66318000 residues

Total number of hits satisfying chosen parameters: 478139

Minimum DB seq length: 0  
Maximum DB seq length: 2000000000

Post-processing: Minimum Match 0%  
Maximum Match 100%  
Listing first 45 summaries

Database : Issued Patents AA: \*  
1: /cgn2\_6/ptodata/1/1aa/5A.COMB.pep: \*  
2: /cgn2\_6/ptodata/1/1aa/5B.COMB.pep: \*  
3: /cgn2\_6/ptodata/1/1aa/6A.COMB.pep: \*  
4: /cgn2\_6/ptodata/1/1aa/6B.COMB.pep: \*  
5: /cgn2\_6/ptodata/1/1aa/PCYUS.COMB.pep: \*  
6: /cgn2\_6/ptodata/1/1aa/backfilest.pep: \*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	ID	Description
1	2814	97.3	539	US-09-518-959-9	Sequence 9, Appli
2	2811	97.2	539	US-09-518-959-8	Sequence 8, Appli
3	1323	45.7	559	US-09-360-197-8	Sequence 8, Appli
4	1275	44.1	526	US-09-360-197-2	Sequence 2, Appli
5	1249.5	43.2	514	US-09-360-197-4	Sequence 4, Appli
6	1198	41.4	533	US-09-360-197-10	Sequence 10, Appli
7	1179	40.8	512	US-08-828-596-2	Sequence 2, Appli
8	1179	40.8	512	US-09-360-197-6	Sequence 6, Appli
9	1165.5	40.3	531	US-09-360-197-14	Sequence 14, Appli
10	1132.5	39.2	563	US-09-360-197-12	Sequence 12, Appli
11	413	14.3	702	US-09-917-254-94	Sequence 94, Appli
12	409.5	14.2	564	US-09-360-197-16	Sequence 16, Appli
13	409	14.1	698	US-08-376-362A-20	Sequence 20, Appli
14	408.5	14.1	625	US-09-360-197-15	Sequence 15, Appli
15	350	12.1	753	US-07-861-458C-98	Sequence 98, Appli
16	347	12.0	493	US-07-861-458C-98	Sequence 98, Appli
17	330	11.4	755	US-07-861-458C-99	Sequence 99, Appli
18	317.5	11.0	520	US-07-861-458C-100	Sequence 100, App
19	225.5	7.8	294	US-07-861-458C-100	Sequence 100, App
20	135	4.7	97	US-09-518-959-9	Sequence 9, Appli
21	132.5	4.2	173	US-09-518-959-9	Sequence 9, Appli
22	116.5	4.0	67	US-09-518-959-9	Sequence 9, Appli
23	113	3.9	1596	US-09-518-959-9	Sequence 9, Appli
24	110.5	3.8	1495	US-09-518-959-9	Sequence 9, Appli
25	110.5	3.8	1495	US-09-518-959-9	Sequence 9, Appli
26	105.5	3.6	830	US-09-518-959-9	Sequence 9, Appli
27	105.5	3.6	4545	US-08-804-227C-14	Sequence 14, Appli

28	105.5	3.6	4550	US-08-804-227C-8	Sequence 8, Appli
29	105.5	3.6	4550	US-08-804-198-2	Sequence 2, Appli
30	104.5	3.6	561	US-09-252-991A-16726	Sequence 16726, A
31	103	3.6	3729	US-08-804-227C-4	Sequence 4, Appli
32	98.5	3.4	830	US-09-562-737-32	Sequence 32, Appli
33	98.5	3.4	1841	US-08-804-227C-6	Sequence 6, Appli
34	98.5	3.4	4630	US-09-091-609-2	Sequence 2, Appli
35	98.5	3.4	5215	US-09-105-537-2	Sequence 2, Appli
36	98	3.4	671	US-09-252-991A-19375	Sequence 19375, A
37	97.5	3.4	11877	US-09-105-537-6	Sequence 6, Appli
38	95	3.3	40	US-07-861-458C-118	Sequence 118, App
39	94.5	3.3	830	US-09-562-737-31	Sequence 31, Appli
40	93	3.2	404	US-09-252-991A-21555	Sequence 21555, A
41	92.5	3.2	326	US-09-270-767-43738	Sequence 43738, A
42	92.5	3.2	1096	US-09-252-991A-19328	Sequence 19328, A
43	92	3.2	73	US-09-518-959-9	Sequence 9, Appli
44	92	3.2	885	US-08-312-892-4	Sequence 4, Appli
45	92	3.2	885	US-09-919-497-52	Sequence 52, Appli

ALIGNMENTS

RESULT 1					
US-09-518-959-9					
Sequence 9, Application US/09518959					
Patent No. 6548270					
GENERAL INFORMATION:					
APPLICANT: Dublin, Adrienne E					
APPLICANT: Huvar, Rene					
APPLICANT: Pyati, Jayashree					
TITLE OF INVENTION: DNA encoding human acid-sensing ion					
FILE REFERENCE: CRT-1197					
CURRENT APPLICATION NUMBER: US/09/518, 959					
CURRENT FILING DATE: 2000-03-03					
NUMBER OF SEQ ID NOS: 9					
SOFTWARE: Patentm Ver. 2.1					
SEQ ID NO 9					
LENGTH: 539					
TYPE: PRT					
ORGANISM: Homo sapiens					
US-09-518-959-9					
Query Match					
Best Local Similarity 97.0%; Pred. No. 2.3e-284;					
Matches 523; Conservative 6; Mismatches 10; Indels 0; Gaps 0;					
Qy	1	MPLEIVCKIKFAEDAKPKRKEAGDEOSLIGAAQGPAPRDATTFASTSTLHGIGRACGP	60		
Db	1	MPLEIVCKIKFAEDAKPKRKEAGDEOSLIGAAQGPAPRDATTFASTSTLHGIGRACGP	60		
Qy	61	GPHELRRTLVALLSLAFLVQASLARGVLTREPLVMDPAAPVAGPAPVTLCTNI	120		
Db	61	GPHELRRTLVALLSLAFLVQASLARGVLTREPLVMDPAAPVAGPAPVTLCTNI	120		
Qy	121	NRPFHSLSDADIFHLNLTGLPKDGRRAAGLRPEPDMDVILNRTGHQADMLKSC	180		
Db	121	NRPFHSLSDADIFHLNLTGLPKDGRRAAGLRPEPDMDVILNRTGHQADMLKSC	180		
Qy	121	NRPFHSLSDADIFHLNLTGLPKDGRRAAGLRPEPDMDVILNRTGHQADMLKSC	180		
Db	121	NRPFHSLSDADIFHLNLTGLPKDGRRAAGLRPEPDMDVILNRTGHQADMLKSC	180		
Qy	181	NFSGHCASNSFSVYTRGKCTTFNADPOSSLPSRAAGSGLEIMLDIQOEYLPIMR	240		
Db	181	NFSGHCASNSFSVYTRGKCTTFNADPOSSLPSRAAGSGLEIMLDIQOEYLPIMR	240		
Qy	181	NFSGHCASNSFSVYTRGKCTTFNADPOSSLPSRAAGSGLEIMLDIQOEYLPIMR	240		
Db	181	NFSGHCASNSFSVYTRGKCTTFNADPOSSLPSRAAGSGLEIMLDIQOEYLPIMR	240		
Qy	241	ETNETSEAGIRVQIHSGEPPYTHOIGFGVSGPOTFVSCORLTYLPQPGNCRAES	300		
Db	241	ETNETSEAGIRVQIHSGEPPYTHOIGFGVSGPOTFVSCORLTYLPQPGNCRAES	300		
Qy	301	KLREPELQGSASVSACRLRCEKAVLQRCRMVMPENETICPPNITIECADHTLDS	360		
Db	301	KLREPELQGSASVSACRLRCEKAVLQRCRMVMPENETICPPNITIECADHTLDS	360		

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OM protein - protein search, using sw model

Run on: December 21, 2004, 07:58:43 ; Search time 79 Seconds

(without alignments)  
3925.657 Million cell updates/sec

Title: US-09-701-747A-2

Perfect score: 2892

Sequence: 1 MPRIYCKIKFAEDAKPKK.....LPNHHPGPPGSLFENFAC 539

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Searched: 1825181 seqs, 575374646 residues

Total number of hits satisfying chosen parameters: 1825181

Minimum DB seq length: 0

Maximum DB seq length: 2000000000

Post-processing: Minimum Match 10%

Maximum Match 10%

Listing first 45 summaries

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

## SUMMARIES

Result No.	Score	Query Match	Length	DB ID	Description
1	2889	99.9	539	2	Q9QYV9
2	2883	99.7	539	2	Q9JHS6
3	2865	99.1	539	2	Q7JNS7
4	2811	97.2	539	2	Q9NQA4
5	2787	96.4	524	2	Q80XK4
6	2680.5	92.7	647	2	Q96FT7
7	1774	61.3	539	2	Q70864
8	1671.5	57.8	558	2	Q70853
9	1671.5	57.8	558	2	Q70853
10	1473	50.9	417	2	Q6PIN9
11	1473	50.9	417	2	Q6PIN9
12	1473	50.9	417	2	Q6PIN9
13	1327	45.9	559	2	Q91YB8
14	1318	45.6	513	2	Q6GMS1
15	1296	44.1	526	1	BNA2_RAT
16	1275	44.1	526	1	BNA2_RAT
17	1274	44.0	526	2	AAH67025
18	1274	44.0	526	2	AAH67025
19	1244.5	43.1	522	2	Q7TIN4
20	1237.5	42.8	557	2	Q70868
21	1237.5	42.8	557	2	Q70868
22	1236	42.6	529	2	Q70866
23	1232	42.6	529	2	Q70866
24	1232	42.6	529	2	Q70866
25	1198	41.4	533	2	Q35240
26	1181	40.8	512	1	BNA1_MOUSE
27	1179	40.8	512	1	BNA1_MOUSE
28	1179	40.8	512	1	BNA1_MOUSE
29	1171.5	40.5	501	2	Q70857
30	1171.5	40.5	501	2	Q70857
31	1170	40.5	531	2	Q75906

32	1165.5	40.3	531	2	Q9UER8	Q9UER8 homo sapien
33	1165.5	40.3	549	2	Q9JHC3	Q9JHC3 homo sapien
34	1165	40.3	543	2	Q9JHC4	Q9JHC4 homo sapien
35	1160	40.1	542	2	Q7TIN4	Q7TIN4 opusanus tau
36	1142.5	39.5	532	2	Q60263	Q60263 homo sapien
37	1132.5	39.2	563	2	Q55163	Q55163 ratius norv
38	1129.5	39.1	563	2	Q61203	Q61203 mus musculu
39	1128.5	39.0	533	2	Q70865	Q70865 brachydantio
40	1128.5	39.0	533	2	Q70865	Q70865 brachydantio
41	1117.5	38.6	563	2	Q8N3E2	Q8N3E2 homo sapien
42	1109.5	38.4	533	2	Q7TIN3	Q7TIN3 opusanus tau
43	1083	37.4	425	2	Q99NA1	Q99NA1 ratius norv
44	951	32.9	309	2	Q57657	Q57657 fugu rubrip
45	840.5	29.1	344	2	Q96CV2	Q96CV2 homo sapien

## ALIGNMENTS

RESULT 1	ID	Q9QYV9	PRELIMINARY	PRT	539 AA
AC	Q9QYV9	01-MAY-2000 (TREMBLrel. 13, Created)			
DT	01-MAY-2000 (TREMBLrel. 13, Last sequence update)				
DT	01-JUN-2003 (TREMBLrel. 24, Last annotation update)				
DE	SPASTIC protein.				
GN	Name=spastic;				
OS	Rattus norvegicus (Rat).				
OC	Eukaryota; Metazoa; Chordata; Vertebrata; Euteleostomi;				
OC	Mammalia; Eutheria; Rodentia; Sciurognathi; Muridae; Rattus.				
OX	NCBI_TaxID=10116;				
RN	[1]				
RP	SEQUENCE FROM N.A.				
RA	Akopian A.N., England S., Chen C.C., Wood J.N.;				
RL	Submitted (MAY-1999) to the EMBL/GenBank/DBJ databases.				
CC	-1- SUBCELLULAR LOCATION: Integral membrane protein (By similarity).				
CC	-1- SIMILARITY: Belongs to the amiloride-sensitive sodium channel family.				
CC	EMBL: AJ242554; CAB61836.1; -				
DR	GO: GO:0016021; C: integral to membrane; IEA.				
DR	GO: GO:0005216; F: ion channel activity; IEA.				
DR	GO: GO:0005272; F: sodium channel activity; IEA.				
DR	GO: GO:0006811; F: ion transport; IEA.				
DR	GO: GO:0006814; P: sodium ion transport; IEA.				
DR	InterPro: IPR001873; Na+channel_ASC.				
DR	Pfam: PF00858; ASC. 1.				
DR	PRINTS: PR01078; AMINACHANNEL.				
KW	Ion transport; Ionic channel; Sodium channel; Transmembrane; Transport.				
SO	SEQUENCE 539 AA; 59352 MW; 2DE4838AA0547097 CRC64;				
Query Match	99.9%; Score 2889; DB 2; Length 539;				
Best Local Similarity	99.8%; Pred. No. 2.6e-231; Indels 0; Gaps 0				
Matches 538; Conservative 1; Mismatches 0; Indels 0; Gaps 0					
Qy	1	MPRIYCKIKFAEDAKPKKENGDEQSLGAAQGPAPAPDLATFPASTSTLHGRCGP	60		
Db	1	MPRIYCKIKFAEDAKPKKENGDEQSLGAAQGPAPAPDLATFPASTSTLHGRCGP	60		
Qy	61	GPRIARTLVVLLTSLAFLYQASLNGYLTTRPVLVMDPAAPAPVAVGPAVTLTNT	120		
Db	61	GPRIARTLVVLLTSLAFLYQASLNGYLTTRPVLVMDPAAPAPVAVGPAVTLTNT	120		
Qy	121	NRPHSALSDADIFHLANTLGLPKPDGGRAGLRYPEPDVYDINRTGHQADMLKSC	180		
Db	121	NRPHSALSDADIFHLANTLGLPKPDGGRAGLRYPEPDVYDINRTGHQADMLKSC	180		
Qy	181	NFSGHCASNFVSVYTRYKCYTFNADPOSSLPSRAGGSGLEIMLDIQSEYLPYWR	240		
Db	181	NFSGHCASNFVSVYTRYKCYTFNADPOSSLPSRAGGSGLEIMLDIQSEYLPYWR	240		
Qy	241	ETNETSFAGIRVQIHQSEPPYTHQIGFVSGFQFVSCQGRRLTYLPQPMGNCRABS	300		
Db	241	ETNETSFAGIRVQIHQSEPPYTHQIGFVSGFQFVSCQGRRLTYLPQPMGNCRABS	300		

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# OM protein - protein search, using sw model

Run on: December 21, 2004, 09:47:03 ; Search time 23 Seconds  
(without alignments)  
2254.819 Million cell updates/sec

Title: US-09-701-747a-2

Perfect score: 2892

Sequence: 1 MPLEIVCKIKFAEDAKPKK.....LPNHHHPGPGSLFENFAC 539

Scoring table: BL0SUM62  
Gapop 10.0 , Gapext 0.5

Searched: 283416 seqs, 96216763 residues

Total number of hits satisfying chosen parameters: 283416

Minimum DB seq length: 0  
Maximum DB seq length: 200000000

Post-processing: Minimum Match 0%  
Maximum Match 100%

Listing first 45 summaries

Database :  
1: p1r1:\*  
2: p1r2:\*  
3: p1r3:\*  
4: p1r4:\*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

## SUMMARIES

Result No.	Score	* Query Match Length	DB ID	Description
1	1142.5	39.5	532 2 JE0091	testis sodium chan
2	422.5	14.6	548 2 T25401	hypothetical prote
3	413	14.3	659 2 A49585	Nat channel protei
4	410	14.2	638 2 T19156	amiloride sensitiv
5	408.5	14.1	625 2 S68434	PKRfamily-activate
6	405	14.0	699 2 S29499	sodium channel pro
7	402.5	13.9	640 2 T51915	epithelial sodium
8	397.5	13.7	650 2 A54065	sodium transport p
9	396.5	13.7	632 2 T51682	epithelial sodium
10	390.5	13.5	664 2 T20420	hypothetical prote
11	386.5	13.4	660 2 T51684	epithelial sodium
12	383	13.2	663 2 T25569	hypothetical prote
13	381.5	13.2	724 2 T25700	mechanosensory pro
14	368.5	12.7	545 2 T25429	hypothetical prote
15	363.5	12.6	638 2 S41159	sodium transport p
16	361	12.5	649 2 T64847	epithelial sodium
17	356	12.3	795 2 T34468	hypothetical prote
18	354.5	12.3	849 2 T19878	hypothetical prote
19	354.5	12.1	926 2 H88226	protein C41C4.5 [i
20	349	12.1	649 2 T38204	epithelial amilor
21	347	12.0	749 2 T29859	mechanosensory pro
22	331.5	11.5	629 2 T25571	hypothetical prote
23	329	11.4	737 2 T16737	hypothetical prote
24	327.5	11.3	638 2 T37309	f1r-1 protein - Ca
25	319.5	11.0	630 2 D87739	hypothetical prote
26	319.5	11.0	630 2 T15144	hypothetical prote
27	314	10.9	608 2 T25572	hypothetical prote
28	308	10.7	643 2 T21256	hypothetical prote
29	307.5	10.6	613 2 T28952	hypothetical prote

30	269.5	9.3	611 2 T20501	hypothetical prote
31	264	9.1	978 2 T16948	hypothetical prote
32	236.5	8.2	297 2 T25652	degenerin 1 (DEG-1
33	230	8.0	599 2 T15552	hypothetical prote
34	229.5	7.9	907 2 T27317	hypothetical prote
35	203	7.0	292 2 T29233	hypothetical prote
36	190.5	6.6	606 2 T20054	amiloride-sensitiv
37	160	5.5	384 2 T19513	hypothetical prote
38	154.5	5.3	840 2 T21333	hypothetical prote
39	113	3.9	1596 2 A35927	190K DNA-binding p
40	110.5	3.8	1495 2 S60255	transcription co-r
41	104.5	3.6	956 2 B83200	probable phosphotr
42	104.5	3.6	6260 2 T30228	polyketide synthas
43	103	3.6	1535 2 S46224	peroxidase - fru1
44	101.5	3.5	1207 1 EGHU	epidermal growth f
45	99.5	3.4	1400 1 T38185	protein-tyrosine k

## ALIGNMENTS

### RESULT 1

JE0091 testis sodium channel 1 - human

C/Species: Homo sapiens (man)

C/Date: 14-May-1998 #sequence\_revision 29-May-1998 #text\_change 09-Jul-2004

C/Accession: JE0091

R/hibashi, K.; Matsumo, F.

Biochem. Biophys. Res. Commun. 245, 589-593, 1998

A/Title: Molecular cloning of a DEG/ENaC sodium channel cDNA from human testis.

A/Reference number: JE0091, PMID:98238685, PMID:9571199

A/Accession: JE0091

A/Molecule type: mRNA

A/Residues: 1-532 <ISH>

A/Cross-references: UNIPROT:O60263; DDBJ:AB010575; NID:G3097313; PIDD:BA25897.1; PIDD:G:

A/Experimental source: testis

C/Keywords: glycoprotein; mitochondrion

F/43-61,443-462/Region: hydrophobic

F/175/Binding site: carbohydrate (Asn) (covalent) #status predicted

Query Match 39.5%; Score 1142.5; DB 2; Length 532;

Best Local Similarity 45.9%; Pred. No. 2,3e-85;

Matches 247; Conservative 62; Mismatches 172; Indels 57; Gaps 12;

QY	35	GPAPR----	DLATPASTSTHGLGRACGPGPRGLRRTLVALLTSLAFLYQAASLAR	90
DB	6	GPEBARQASDIRVFASNCMGLGVFGFGLSLRGMMAAVLSVATFLVQVARRV	65	
QY	91	GYLTRPHTLVMDPAPAPVAVGPPAVTLVNIINFRHSALSPADIFHLAN--LTGLPPKRD	148	
DB	66	YVNEFHHTLDRBSHRL--FPVATLVNINPLRRRLTPNDL--HMAAGSLGLDPAEHA	123	
QY	149	GHRDAGLRYP-----DWDVILNRTGQLOLMDLKSCHNSCHSASNSVYTRY	199	
DB	124	APFLAAGRPAPPGFMPSPFFDMAOLYARAGSLDMLDCRRGQCPGPNFTTITFTM	183	
QY	200	GKCYTN--ADPQSLPSRAGSGGLBTLMDIOEYVLPIMETNETSPGAGIRQIHS	257	
DB	184	GKCTTNSGADGELLITTRGGMGNGDMLDVOQSBYLPVMDNBEETPEVGIRVOIHG	243	
QY	258	QEEPPYTHQFGVSPGFQTFVSCOEORLTLYLPQPGNCRAS-----K	301	
DB	244	HEBPPIIDQGLGVSPGYQTFVSCQOQSLFLPPPGDSSALNPNYBEPDPLGSPK	303	
QY	302	LRPELQGSAYSVAACRLCEKEAVLQRCCHVMVMPGNETICPNYITECDHTLDSL	361	
DB	304	PPAPAL-----PIPFMGCRILACEFRVYARCKGCMVMPGVPVCSFOQYGNCAHPADAM	359	
QY	362	GGSGEPPCPPTPCNLTTRYKEISWTKIPNRSARLARKYNNENYIEBNPLVLPPE	421	
DB	360	--LRKSCAPNCASTRAKELSMVRIPSRAARFLARKRBRATVIAENVATLDIIFE	417	
QY	422	ALTSEAMEGRPAAYGSLALGLDGLGQGLPFGASITLTBLIDYIEVSWDR--LKRVRRP	480	

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OM protein - protein search, using sw model

Run on: December 21, 2004, 07:56:27 ; Search time 73 Seconds

(without alignments)  
2648.700 Million cell updates/sec

Title: US-09-701-747A-2

Perfect score: 2892  
Sequence: 1 MPLEIVCKIKFAEDAKPKR.....LPNNHHPGPPSLFENFAC 539

Scoring table: BLOSUM62

Gapop 10.0 , Gapext 0.5

Searched: 2002273 seqs, 35872929 residues

Total number of hits satisfying chosen parameters: 2002273

Minimum DB seq length: 0  
Maximum DB seq length: 200000000

Post-processing: Minimum Match 0%  
Maximum Match 100%

Listing first 45 summaries

Database: A\_Geneseq\_23Sep04:\*

1: geneseqp1980s:\*  
2: geneseqp1990s:\*  
3: geneseqp2000s:\*  
4: geneseqp2001s:\*  
5: geneseqp2002s:\*  
6: geneseqp2003as:\*  
7: geneseqp2003bs:\*  
8: geneseqp2004s:\*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

# SUMMARIES

Result No.	Score	Query	Match Length	ID	Description
1	2892	100.0	539	AAV53870	AAY53870 Amino aci
2	2814	97.3	539	AAE10898	AAE10898 Human bra
3	2811	97.2	539	AAW80318	AAW80318 Neurodege
4	2811	97.2	539	AAE10897	AAE10897 Human bra
5	2811	97.2	539	ABR58577	ABR58577 Human can
6	2811	97.2	539	ADN38972	ADN38972 Cancer/an
7	2811	97.2	653	ABP69359	ABP69359 Human pol
8	2799	96.8	539	AAW80315	AAW80315 Neurodege
9	2571	88.9	587	AAW80316	AAW80316 Neurodege
10	1897	65.6	401	AAW07750	AAW07750 A human a
11	1323	45.7	559	AAW68507	AAW68507 Rat aci
12	1323	45.7	559	AAV69178	AAV69178 A rat aci
13	1311.5	44.3	562	ABP70739	ABP70739 Human pro
14	1296	44.8	513	AAV03186	AAV03186 Rat Acid
15	1275	44.1	526	AAW68504	AAW68504 Rat aci
16	1275	44.1	526	AAV03188	AAV03188 Rat Acid
17	1275	44.1	526	AAV69175	AAV69175 A rat aci
18	1265	43.7	318	ADH22534	ADH22534 Human tra
19	1261	43.6	514	ABU65092	ABU65092 Human NOV
20	1249.5	43.2	514	ADN61835	ADN61835 Human nov
21	1249.5	43.2	514	AAW68505	AAW68505 Human aci
22	1249.5	43.2	514	AAV69176	AAV69176 A partial
23	1198	41.4	533	AAW68508	AAW68508 Rat aci
24	1198	41.4	533	AAV69179	AAV69179 A rat aci
25	1198	41.4	533	AAU10906	AAU10906 Rat acid

26	1198	41.4	533	8	ADN97426	ADN97426 Rat DRASI
27	1179	40.8	512	2	AAW68506	AAW68506 Human aci
28	1179	40.8	512	2	AAW93420	AAW93420 Human BNC
29	1179	40.8	512	3	AAV69177	AAV69177 A human a
30	1179	40.8	512	5	AAU10905	AAU10905 Rat aci
31	1179	40.8	512	5	AAU10903	AAU10903 Human aci
32	1179	40.8	512	7	ADN14073	ADN14073 Human src
33	1179	40.8	512	8	ADK71115	ADK71115 Human aci
34	1179	40.8	512	8	ADN97420	ADN97420 Rat BNC1
35	1179	40.8	512	8	ADP43821	ADP43821 Human aci
36	1170	40.5	531	2	AAV09509	AAV09509 Human pro
37	1170	40.5	531	5	AAU10904	AAU10904 Human aci
38	1170	40.5	531	8	ADN97424	ADN97424 Human DRA
39	1165.5	40.3	529	8	ADQ28595	ADQ28595 Human SLN
40	1165.5	40.3	531	3	AAV69181	AAV69181 A human a
41	1165.5	40.3	531	7	AAE38601	AAE38601 Human aci
42	1165.5	40.3	531	7	ADE34065	ADE34065 Human aci
43	1165.5	40.3	549	2	AAW68252	AAW68252 Sodium ch
44	1165	40.3	543	2	AAW88250	AAW88250 Sodium ch
45	1139.5	39.4	518	2	AAW88251	AAW88251 Sodium ch

## ALIGNMENTS

RESULT 1  
AAV53870  
ID AAV53870 standard; protein; 539 AA.  
XX  
AC AAV53870;  
XX  
DT 13-MAR-2000 (first entry)  
XX  
DE Amino acid sequence of a H+-gated cation channel designated SPASIC.  
XX  
KW H+-gated cation channel; SPASIC; dorsal root ganglion; gene therapy;  
KW acid sensitive cation channel; central nervous system; pain response;  
KW ion channel activity; neurotransmitter release; analgesic;  
KW neuromodulatory; anti-inflammatory; neurotransmitter release;  
KW neuronal excitability.  
XX  
OS Rattus norvegicus.  
XX  
XX  
XX W09963081-A2.  
XX  
PD 09-DEC-1999.  
XX  
PF 03-JUN-1999; 99WO-GB001743.  
XX  
PR 03-JUN-1998; 98GB-00011965.  
XX  
PA (UNLO ) UNIV COLLEGE LONDON.  
XX  
PI Wood JN, England S, Chen CC, Akopian AN;  
XX WPI; 2000-086977/07.  
DR N-PSDB; AA236802.  
PT Novel ion channel protein for use as an analgesic drug target and for  
PT identifying novel analgesic and antiinflammatory agents.  
XX  
XX Claim 2; Page 51-52; 55pp; English.  
PS  
XX The present sequence represents a H+-gated cation channel, designated  
CC SPASIC. The cDNA sequence was isolated from a rat dorsal root ganglion  
CC cDNA library. The protein is an acid sensitive cation channel capable of  
CC reversibly mediating rapid and sustained cation current. The channel is  
CC present in dorsal root ganglion and in central nervous system tissues.  
CC The SPASIC polynucleotide and polypeptide are used in influencing  
CC electrophysiological and/or pharmacological properties of a cell.  
CC Expression of the SPASIC gene or antisense sequences leads to an increase  
CC or reduction in ion channel activity. The SPASIC gene is used in gene  
CC therapy or in preparation of medicaments for gene therapy to inhibit pain

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# OM nucleic - nucleic search, using sw model

Run on: December 21, 2004, 06:28:07 ; Search time 1710 Seconds  
(without alignment)

8465.284 Million cell updates/sec

Title: US-09-701-747A-1  
Perfect score: 2622  
Sequence: 1 agtgcacgctgtcggtgc.....aaaaaaaaaaaaaaaa 2622

Scoring table: OLIGO NUC  
Gapex 60.0, Gapext 60.0

Searched: 4093002 seqs, 2760418825 residues

Word size : 16

Total number of hits satisfying chosen parameters: 297542

Minimum DB seq length: 0

Maximum DB seq length: 200000000

Post-processing: Listing first 500 summaries

Database : Published Applications NA.\*

- 1: /cgn2\_6/ptodata/2/pubpna/US07\_PUBCOMB.seq.\*
- 2: /cgn2\_6/ptodata/2/pubpna/PC1\_NEW\_PUB.seq.\*
- 3: /cgn2\_6/ptodata/2/pubpna/US06\_NEW\_PUB.seq.\*
- 4: /cgn2\_6/ptodata/2/pubpna/US06\_PUBCOMB.seq.\*
- 5: /cgn2\_6/ptodata/2/pubpna/US07\_NEW\_PUB.seq.\*
- 6: /cgn2\_6/ptodata/2/pubpna/PC1US\_PUBCOMB.seq.\*
- 7: /cgn2\_6/ptodata/2/pubpna/US08\_NEW\_PUB.seq.\*
- 8: /cgn2\_6/ptodata/2/pubpna/US08\_PUBCOMB.seq.\*
- 9: /cgn2\_6/ptodata/2/pubpna/US09\_PUBCOMB.seq.\*
- 10: /cgn2\_6/ptodata/2/pubpna/US09\_PUBCOMB.seq.\*
- 11: /cgn2\_6/ptodata/2/pubpna/US09C\_PUBCOMB.seq.\*
- 12: /cgn2\_6/ptodata/2/pubpna/US09\_NEW\_PUB.seq.\*
- 13: /cgn2\_6/ptodata/2/pubpna/US10\_PUBCOMB.seq.\*
- 14: /cgn2\_6/ptodata/2/pubpna/US10\_PUBCOMB.seq.\*
- 15: /cgn2\_6/ptodata/2/pubpna/US10C\_PUBCOMB.seq.\*
- 16: /cgn2\_6/ptodata/2/pubpna/US10D\_PUBCOMB.seq.\*
- 17: /cgn2\_6/ptodata/2/pubpna/US10E\_PUBCOMB.seq.\*
- 18: /cgn2\_6/ptodata/2/pubpna/US10\_PUBCOMB.seq.\*
- 19: /cgn2\_6/ptodata/2/pubpna/US11\_NEW\_PUB.seq.\*
- 20: /cgn2\_6/ptodata/2/pubpna/US11\_NEW\_PUB.seq.\*
- 21: /cgn2\_6/ptodata/2/pubpna/US60\_PUBCOMB.seq.\*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

## SUMMARIES

Result No.	Score	Query Match	Length	ID	Description
1	80	3.1	2431	16 US-10-302-172-458	Sequence 458, App
2	80	3.1	2710	15 US-10-295-027-289	Sequence 289, App
3	80	3.1	2711	10 US-09-772-180A-1	Sequence 1, Appli
4	80	3.1	2955	10 US-09-772-180A-3	Sequence 3, Appli
5	68	2.6	462	10 US-09-918-995-481	Sequence 481, App
6	68	2.6	465	10 US-09-918-995-478	Sequence 478, App
7	68	2.6	1632	10 US-09-772-180A-7	Sequence 7, Appli
8	40	1.5	65	10 US-09-908-975-2131	Sequence 2131, Ap
9	30	1.1	424	11 US-09-969-034-1620	Sequence 1620, Ap
10	29	1.1	254	16 US-10-424-559-84829	Sequence 84829, A
11	29	1.1	396	9 US-09-825-294-20	Sequence 20, Appl
12	29	1.1	396	9 US-09-970-966-20	Sequence 20, Appl

C 13	29	1.1	396	10 US-09-814-353-4322	Sequence 4322, Ap
C 14	29	1.1	396	10 US-09-814-353-10626	Sequence 10626, A
C 15	29	1.1	396	15 US-10-212-677-20	Sequence 20, Appl
C 16	29	1.1	396	15 US-10-361-811-20	Sequence 20, Appl
C 17	29	1.1	396	15 US-10-369-186-20	Sequence 20, Appl
C 18	29	1.1	451	9 US-09-860-670-39	Sequence 39, Appli
C 19	29	1.1	451	15 US-10-227-646-39	Sequence 39, Appli
C 20	29	1.1	462	15 US-10-101-510-176	Sequence 176, App
C 21	29	1.1	462	15 US-10-101-510-176	Sequence 176, App
C 22	29	1.1	574	9 US-09-919-580-71	Sequence 71, Appl
C 23	29	1.1	613	11 US-09-969-034-828	Sequence 828, App
C 24	29	1.1	891	14 US-10-198-846-6156	Sequence 6156, App
C 25	29	1.1	1374	17 US-10-437-963-84556	Sequence 84556, A
C 26	29	1.1	1654	17 US-10-425-115-44120	Sequence 44120, A
C 27	28	1.1	39	15 US-10-219-195-28	Sequence 28, Appli
C 28	28	1.1	39	15 US-10-219-195-28	Sequence 28, Appli
C 29	28	1.1	39	15 US-10-219-195-34	Sequence 34, Appli
C 30	28	1.1	39	15 US-10-219-195-49	Sequence 49, Appli
C 31	28	1.1	41	11 US-09-876-143-867	Sequence 867, App
C 32	28	1.1	46	9 US-09-827-289-22	Sequence 22, Appl
C 33	28	1.1	46	9 US-09-827-289-26	Sequence 26, Appl
C 34	28	1.1	62	16 US-10-182-327-182	Sequence 182, App
C 35	28	1.1	67	9 US-09-983-965-42	Sequence 42, Appl
C 36	28	1.1	67	9 US-09-983-965-42	Sequence 42, Appl
C 37	28	1.1	70	9 US-09-925-298-396	Sequence 396, App
C 38	28	1.1	70	14 US-10-102-806-396	Sequence 396, App
C 39	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 40	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 41	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 42	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 43	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 44	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 45	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 46	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 47	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 48	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 49	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 50	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 51	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 52	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 53	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
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C 55	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 56	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 57	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 58	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 59	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 60	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 61	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 62	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 63	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 64	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 65	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 66	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 67	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 68	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 69	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 70	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 71	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 72	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 73	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 74	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 75	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 76	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 77	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 78	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 79	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 80	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 81	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 82	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 83	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 84	28	1.1	75	11 US-09-876-143-867	Sequence 867, App
C 85	28	1.1	75	11 US-09-876-143-867	Sequence 867, App

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OM nucleic - nucleic search, using sw model

Run on: December 21, 2004, 03:58:12 / Search time 151 Seconds  
(without alignments) 12342.308 Million cell updates/sec

Title: US-09-701-747A-1

Perfect score: 2622

Sequence: 1 agtgcacagctgctgcggtgc.....aaaaaaaaaaaaaaaaa 2622

Scoring table:

Gapop 60.0, Gapext 60.0

Searched: 824507 seqs, 355394441 residues

Word size: 16

Total number of hits satisfying chosen parameters: 21439

Minimum DB seq length: 0

Maximum DB seq length: 200000000

Post-processing: Listing first 500 summaries

Database: Issued Patents NA:

1: /cgn2\_6/ptodata/1/ina/5A.COMB.seq:\*  
2: /cgn2\_6/ptodata/1/ina/5B.COMB.seq:\*  
3: /cgn2\_6/ptodata/1/ina/6A.COMB.seq:\*  
4: /cgn2\_6/ptodata/1/ina/6B.COMB.seq:\*  
5: /cgn2\_6/ptodata/1/ina/PTCUS.COMB.seq:\*  
6: /cgn2\_6/ptodata/1/ina/backfile1.seq:\*

Pred. No. is the number of results predicted by chance to have a  
score greater than or equal to the score of the result being printed,  
and is derived by analysis of the total score distribution.

## SUMMARIES

Result No.	Score	Query Match	Length	ID	Description
1	80	3.1	2431	4	US-09-799-451-458
2	80	3.1	2528	4	US-09-518-959-7
3	68	2.6	1620	4	US-09-518-959-6
4	32	1.2	50	4	US-09-518-959-1
5	31	1.2	40	4	US-09-518-959-5
6	29	1.1	396	4	US-09-640-173-20
7	29	1.1	396	4	US-09-713-550-20
8	29	1.1	396	4	US-09-825-294-20
9	29	1.1	396	4	US-09-970-966-20
10	28	1.1	44	1	US-08-664-596B-9
11	28	1.1	46	4	US-09-827-289-22
12	28	1.1	46	4	US-09-827-289-26
13	28	1.1	54	2	US-08-776-944-8
14	28	1.1	55	4	US-09-621-976-11651
15	28	1.1	57	4	US-09-513-999C-11821
16	28	1.1	59	4	US-09-621-976-11876
17	28	1.1	69	4	US-09-621-976-11887
18	28	1.1	69	4	US-09-621-976-12454
19	28	1.1	70	4	US-09-621-976-12440
20	28	1.1	72	4	US-09-621-976-12390
21	28	1.1	73	4	US-09-621-976-14698
22	28	1.1	77	4	US-09-621-976-12266
23	28	1.1	81	3	US-09-014-416-57
24	28	1.1	81	4	US-09-621-976-12198
25	28	1.1	81	4	US-09-621-976-13601
26	28	1.1	82	4	US-09-621-976-11689
27	28	1.1	82	4	US-09-621-976-11841

28	28	1.1	82	4	US-09-621-976-11864	Sequence 11864, A
29	28	1.1	82	4	US-09-621-976-11888	Sequence 11888, A
30	28	1.1	82	4	US-09-621-976-11944	Sequence 11944, A
31	28	1.1	82	4	US-09-621-976-11949	Sequence 11949, A
32	28	1.1	82	4	US-09-621-976-12015	Sequence 12015, A
33	28	1.1	82	4	US-09-621-976-12088	Sequence 12088, A
34	28	1.1	82	4	US-09-621-976-12103	Sequence 12103, A
35	28	1.1	82	4	US-09-621-976-12127	Sequence 12127, A
36	28	1.1	82	4	US-09-621-976-12131	Sequence 12131, A
37	28	1.1	82	4	US-09-621-976-12137	Sequence 12137, A
38	28	1.1	82	4	US-09-621-976-12332	Sequence 12332, A
39	28	1.1	82	4	US-09-621-976-12368	Sequence 12368, A
40	28	1.1	82	4	US-09-621-976-13456	Sequence 13456, A
41	28	1.1	82	4	US-09-621-976-12087	Sequence 12087, A
42	28	1.1	83	4	US-09-621-976-12175	Sequence 12175, A
43	28	1.1	83	4	US-09-621-976-12195	Sequence 12195, A
44	28	1.1	83	4	US-09-621-976-12429	Sequence 12429, A
45	28	1.1	83	4	US-09-621-976-12450	Sequence 12450, A
46	28	1.1	84	4	US-09-621-976-11710	Sequence 11710, A
47	28	1.1	90	1	US-08-677-944-2	Sequence 2, Appl1
48	28	1.1	91	4	US-09-621-976-12161	Sequence 12161, A
49	28	1.1	98	4	US-09-621-976-11744	Sequence 11744, A
50	28	1.1	105	4	US-09-621-976-13820	Sequence 13820, A
51	28	1.1	106	4	US-09-621-976-12079	Sequence 12079, A
52	28	1.1	123	4	US-09-621-976-12330	Sequence 12330, A
53	28	1.1	127	3	US-09-014-416-59	Sequence 59, Appl1
54	28	1.1	148	4	US-09-621-976-8100	Sequence 8100, Ap
55	28	1.1	149	4	US-09-621-976-8863	Sequence 8863, Ap
56	28	1.1	149	4	US-09-621-976-8942	Sequence 8942, Ap
57	28	1.1	150	4	US-09-621-976-8942	Sequence 8942, Ap
58	28	1.1	150	4	US-09-621-976-8942	Sequence 8942, Ap
59	28	1.1	150	4	US-09-621-976-8942	Sequence 8942, Ap
60	28	1.1	150	4	US-09-621-976-8942	Sequence 8942, Ap
61	28	1.1	153	4	US-09-621-976-7751	Sequence 7751, Ap
62	28	1.1	154	4	US-09-621-976-18058	Sequence 18058, A
63	28	1.1	159	4	US-09-621-976-8623	Sequence 8623, Ap
64	28	1.1	159	4	US-09-621-976-8655	Sequence 8655, Ap
65	28	1.1	160	4	US-09-621-976-18071	Sequence 18071, A
66	28	1.1	162	4	US-09-621-976-18068	Sequence 18068, A
67	28	1.1	164	4	US-09-621-976-8070	Sequence 8070, Ap
68	28	1.1	166	4	US-09-621-976-8651	Sequence 8651, Ap
69	28	1.1	170	4	US-09-621-976-19172	Sequence 19172, A
70	28	1.1	176	3	US-09-014-416-63	Sequence 63, Appl1
71	28	1.1	177	4	US-09-621-976-8073	Sequence 8073, Ap
72	28	1.1	179	4	US-09-621-976-18054	Sequence 18054, A
73	28	1.1	182	4	US-09-621-976-16234	Sequence 16234, A
74	28	1.1	183	3	US-09-014-416-60	Sequence 60, Appl1
75	28	1.1	183	4	US-09-621-976-13606	Sequence 13606, A
76	28	1.1	184	3	US-09-480-921B-13	Sequence 13, Appl1
77	28	1.1	195	4	US-09-621-976-18062	Sequence 18062, A
78	28	1.1	198	5	US-08-330-108-16	Sequence 16, Appl1
79	28	1.1	198	5	PCT-US97-10087-16	Sequence 64, Appl1
80	28	1.1	200	3	US-09-014-416-64	Sequence 64, Appl1
81	28	1.1	203	4	US-09-621-976-16454	Sequence 16454, A
82	28	1.1	204	4	US-09-621-976-1323	Sequence 1323, Ap
83	28	1.1	209	4	US-09-621-976-12920	Sequence 12920, A
84	28	1.1	221	4	US-09-621-976-13585	Sequence 13585, A
85	28	1.1	227	2	US-08-520-678A-28	Sequence 28, Appl1
86	28	1.1	227	2	US-08-897-126-28	Sequence 28, Appl1
87	28	1.1	228	3	US-09-328-111-484	Sequence 484, Ap
88	28	1.1	232	4	US-09-621-976-17701	Sequence 17701, A
89	28	1.1	240	4	US-09-621-976-1324	Sequence 1324, Ap
90	28	1.1	245	4	US-09-621-976-17945	Sequence 17945, A
91	28	1.1	249	4	US-09-621-976-17029	Sequence 17029, A
92	28	1.1	249	4	US-09-621-976-13322	Sequence 13322, Ap
93	28	1.1	253	2	US-08-520-678A-25	Sequence 25, Appl1
94	28	1.1	253	2	US-08-897-126-25	Sequence 25, Appl1
95	28	1.1	257	2	US-08-520-678A-24	Sequence 24, Appl1
96	28	1.1	257	2	US-08-897-126-24	Sequence 24, Appl1
97	28	1.1	260	2	US-08-520-678A-29	Sequence 29, Appl1
98	28	1.1	260	3	US-08-897-126-29	Sequence 29, Appl1
99	28	1.1	261	4	US-09-621-976-17067	Sequence 17067, A
100	28	1.1	267	4	US-09-621-976-14155	Sequence 14155, A





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OM nucleic - nucleic search, using sw model

Run on: December 21, 2004, 02:00:56 ; Search time 818 Seconds  
(without alignments)  
16826.384 Million cell updates/sec

Title: US-09-701-747A-1

Perfect score: 2622  
Sequence: 1 agtgcacgcctgcgcggtgc.....aaaaaaaaaaaaaaaa 2622

Scoring table: OLIGO NUC  
Gapop 60.0 , Gapext 60.0

Searched: 4134886 seqs, 2624710521 residues

Word size : 16

Total number of hits satisfying chosen parameters: 249225

Minimum DB seq length: 0  
Maximum DB seq length: 2000000000

Post-processing: Listing first 500 summaries

Database : N\_Geneseq\_23Sep04.\*

1: geneseq1980s.\*  
2: geneseq1990s.\*  
3: geneseq2000s.\*  
4: geneseq2001as.\*  
5: geneseq2001bs.\*  
6: geneseq2002as.\*  
7: geneseq2002bs.\*  
8: geneseq2003as.\*  
9: geneseq2003bs.\*  
10: geneseq2003cs.\*  
11: geneseq2003ds.\*  
12: geneseq2004s.\*

Pred. No. is the number of results predicted by chance to have a  
score greater than or equal to the score of the result being printed,  
and is derived by analysis of the total score distribution.

## SUMMARIES

Result No.	Score	Query Match	Length	ID	Description
1	2622	100.0	2622	3 AA236802	AA236802 Nucleic a
2	80	3.1	2431	6 AB211576	AB211576 Human pol
3	80	3.1	2431	12 ADMA4094	ADMA4094 Novel hum
4	80	3.1	2516	3 AAA59323	AAA59323 DNA encod
5	80	3.1	2528	5 AAAD18265	AAAD18265 Human bra
6	80	3.1	2710	10 ACC72703	ACC72703 Human can
7	80	3.1	2710	11 ADN38971	ADN38971 Cancer/an
8	80	3.1	2711	2 AAV68056	AAV68056 Neurodege
9	80	3.1	2752	12 ADH22600	ADH22600 CDNA enco
10	80	3.1	2955	2 AAV68057	AAV68057 Neurodege
11	68	2.6	462	9 ACH13269	ACH13269 Human adu
12	68	2.6	465	9 ACH13266	ACH13266 Human adu
13	68	2.6	1203	3 AAA59324	AAA59324 Coding re
14	68	2.6	1632	3 AAV68059	AAV68059 Neurodege
15	68	2.6	65	6 AAB29383	AAB29383 Rat splic
16	32	1.2	50	5 AAD18260	AAAD18260 Human bra
17	31	1.2	40	5 AAB57925	AB57925 Human col
18	30	1.1	424	6 AAB57925	AB57925 Human col
19	29	1.1	271	4 AAB14984	AB14984 Human bre
20	29	1.1	313	4 AABV04496	ABV04496 Human pro
21	29	1.1	335	5 AABV57836	ABV57836 Human pro

22	C	23	29	1.1	396	4 AAF94829	AAF94829 Human ova
23	C	24	29	1.1	396	5 ADL36736	ADL36736 Human ova
24	C	25	29	1.1	396	6 ADL71580	ADL71580 Human ova
25	C	26	29	1.1	396	6 ABL48779	ABL48779 Ovarian c
26	C	27	29	1.1	396	6 ABT03096	ABT03096 Human ova
27	C	28	29	1.1	396	11 ADML0689	ADML0689 Human ova
28	C	29	29	1.1	396	12 ADJ11019	ADJ11019 Represent
29	C	30	29	1.1	396	12 ADMA43280	ADMA43280 Human ova
30	C	31	29	1.1	451	4 AAI62780	AAI62780 Human CDN
31	C	32	29	1.1	451	5 ABA13241	ABA13241 Human ner
32	C	33	29	1.1	462	6 ABA23505	ABA23505 Human gen
33	C	34	29	1.1	462	6 ABZ35064	ABZ35064 Human gen
34	C	35	29	1.1	574	6 ABK54601	ABK54601 Human col
35	C	36	29	1.1	613	6 ABQ57133	ABQ57133 Human col
36	C	37	29	1.1	41	6 ABA73933	ABA73933 Bovine em
37	C	38	29	1.1	45	12 ADM98336	ADM98336 Human FGB
38	C	39	29	1.1	46	6 AAS95732	AAS95732 Allele di
39	C	40	29	1.1	46	6 AAS95736	AAS95736 Allele di
40	C	41	29	1.1	48	6 ABK30223	ABK30223 CYP2D6 ge
41	C	42	29	1.1	51	4 AAL30531	AAL30531 Human SNP
42	C	43	29	1.1	51	6 ABK30191	ABK30191 CYP2D6 ge
43	C	44	29	1.1	52	6 ABK30190	ABK30190 CYP2D6 ge
44	C	45	29	1.1	54	2 AAT17031	AAT17031 Human mit
45	C	46	29	1.1	55	12 ADM98347	ADM98347 Human LPL
46	C	47	29	1.1	57	3 AAC15746	AAC15746 Human sec
47	C	48	29	1.1	62	5 AAD13992	AD13992 Deletion
48	C	49	29	1.1	64	8 ABA50113	ABA50113 Bovine ES
49	C	50	29	1.1	65	12 ADM98353	ADM98353 Human NPP
50	C	51	29	1.1	66	10 ADF11666	ADF11666 Human SRP
51	C	52	29	1.1	67	6 ABL14133	ABL14133 Fluoresee
52	C	53	29	1.1	67	8 ABA50316	ABA50316 Bovine ES
53	C	54	29	1.1	70	3 AAF22009	AAF22009 Human bre
54	C	55	29	1.1	75	6 ABA73475	ABA73475 Bovine em
55	C	56	29	1.1	78	6 ABAV68830	ABV68830 Human pan
56	C	57	29	1.1	83	3 AAF22006	AAF22006 Human bre
57	C	58	29	1.1	84	12 ADK52282	ADK52282 Murine ty
58	C	59	29	1.1	85	12 ADG5306	ADG5306 Template
59	C	60	29	1.1	87	6 ABA99435	ABA99435 B. mori T
60	C	61	29	1.1	89	8 ABA44974	ABA44974 Bovine ES
61	C	62	29	1.1	90	2 AAT47082	AAT47082 Synthetic
62	C	63	29	1.1	101	6 ABL37986	ABL37986 Human col
63	C	64	29	1.1	101	6 ADG19100	ADG19100 RNA-depen
64	C	65	29	1.1	103	10 ADCL7856	ADCL7856 Monobacta
65	C	66	29	1.1	107	10 ADCL7845	ADCL7845 Monobacta
66	C	67	29	1.1	108	4 ABA43640	ABA43640 SSG #6. 1
67	C	68	29	1.1	109	5 AAF98681	AAF98681 Human ova
68	C	69	29	1.1	109	8 ABA37401	ABA37401 Bovine ES
69	C	70	29	1.1	110	2 AAX35561	AAX35561 Secreted
70	C	71	29	1.1	110	9 ADA45152	ADA45152 Human pol
71	C	72	29	1.1	111	10 ADCL7844	ADCL7844 Monobacta
72	C	73	29	1.1	111	10 ADG37675	ADG37675 Aspergill
73	C	74	29	1.1	112	10 ADCL7848	ADCL7848 Monobacta
74	C	75	29	1.1	114	10 ADCL7852	ADCL7852 Monobacta
75	C	76	29	1.1	115	6 ABA82937	ABA82937 Human pro
76	C	77	29	1.1	116	6 AAL15706	AAL15706 Human bre
77	C	78	29	1.1	117	6 ABAV7342	ABV7342 Human pan
78	C	79	29	1.1	120	3 ABA89576	ABA89576 Exo20 nuc
79	C	80	29	1.1	120	4 ABAH70046	ABH70046 Human cer
80	C	81	29	1.1	120	6 ABAK76458	ABK76458 Bacillus
81	C	82	29	1.1	121	8 ABA54306	ABA54306 Bovine ES
82	C	83	29	1.1	122	12 ADO41190	ADO41190 Human CDN
83	C	84	29	1.1	125	6 ABL37601	ABL37601 Human col
84	C	85	29	1.1	127	2 AAX24845	AAX24845 Infectio
85	C	86	29	1.1	130	4 ABAK89973	ABK89973 Human dig
86	C	87	29	1.1	130	4 AAI62629	AAI62629 Human bre
87	C	88	29	1.1	130	4 AAK78760	AAK78760 Human lmm
88	C	89	29	1.1	130	4 AAK79573	AAK79573 Human lmm
89	C	90	29	1.1	130	4 AAK73943	AAK73943 Human lmm
90	C	91	29	1.1	130	4 AAL06723	AAL06723 Human rep
91	C	92	29	1.1	130	4 AAL05021	AAL05021 Human rep
92	C	93	29	1.1	130	4 AAL07126	AAL07126 Human rep
93	C	94	29	1.1	130	4 ABA08160	ABA08160 Human ova
94	C	95	29	1.1	130	4 ABL97914	ABL97914 Human tes

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OM nucleic - nucleic search, using sw model

Run on: December 21, 2004, 02:03:42 ; Search time 7228 Seconds  
(without alignments)  
17154.620 Million cell updates/sec

Title: US-09-701-747A-1

Perfect score: 2622  
Sequence: 1 agtgcacgcgtcgtgcgtgc.....aaaaaaaaaaaaaaaaa 2622

Scoring table: OLIGO\_NUC  
Gapop 60.0 , Gapext 60.0

Searched: 4526729 seqs, 2364489745 residues

Word size : 16

Total number of hits satisfying chosen parameters: 478857

Minimum DB seq length: 0

Maximum DB seq length: 200000000

Post-processing: Listing first 500 summaries

Database :

GenEmbl:\*  
1: gb\_ba:\*  
2: gb\_hcg:\*  
3: gb\_in:\*  
4: gb\_ov:\*  
5: gb\_ov:\*  
6: gb\_pat:\*  
7: gb\_ph:\*  
8: gb\_pl:\*  
9: gb\_pr:\*  
10: gb\_ro:\*  
11: gb\_sbs:\*  
12: gb\_sy:\*  
13: gb\_un:\*  
14: gb\_vt:\*

Pred. No. is the number of results predicted by chance to have a  
score greater than or equal to the score of the result being printed,  
and is derived by analysis of the total score distribution.

#### SUMMARIES

Result No.	Score	Query Match	Length	ID	Description
1	2622	100.0	2622	6	AX009297 Sequence
2	2195	83.7	2622	10	RNO242554 Rattus no
3	1761	67.2	2532	10	RNO271642 Rattus no
4	823	31.4	216648	10	AC112361 Rattus no
5	823	31.4	261617	2	AC121633 Rattus no
6	161	6.1	2301	10	BC046481 Mus muscu
7	161	6.1	2478	10	BC055772 Mus muscu
8	137	5.2	177632	2	AC114651 Mus muscu
9	137	5.2	197109	2	AC115011 Mus muscu
10	80	3.1	2528	6	AR306271 Homo sapi
11	80	3.1	2528	6	AR306271 Homo sapi
12	80	3.1	2528	6	AR306271 Homo sapi
13	80	3.1	2711	6	E31843 Novel compo
14	80	3.1	2711	6	E31843 Novel compo
15	80	3.1	2955	6	E31844 Novel compo
16	80	3.1	2955	6	AX002414 Sequence
17	80	3.1	3345	9	BC031812 Homo sapi
18	80	3.1	3685	9	HA5271643 Homo sapi
19	80	3.1	183625	9	AC053503 Homo sapi

20	80	3.1	184176	2	AC149120 Papio anu
21	80	3.1	186883	2	AC040991 Homo sapi
22	80	3.1	193064	2	AC149860 Papio anu
23	68	2.6	1620	6	AR306270 Sequence
24	68	2.6	1632	6	E31846 Novel compo
25	68	2.6	1632	6	AX002418 Sequence
26	68	2.6	2439	9	BC073912 Homo sapi
27	63	2.4	200465	2	AC148786 Otolenur
28	63	2.4	215101	2	AC148847 Otolenur
29	59	2.3	1452	6	CQ714799 Sequence
30	50	1.9	1315	6	HA5408882 Homo sapi
31	31	1.9	135033	9	AC009955 Homo sapi
32	42	1.6	53239	2	AC011971 Homo sapi
33	33	1.5	65	6	CQ532496 Sequence
34	32	1.2	50	6	AR306265 Sequence
35	31	1.2	40	6	AR306269 Sequence
36	30	1.1	601	11	G94636
37	29	1.1	271	6	CQ422415 Sequence
38	29	1.1	313	6	CQ472620 Sequence
39	29	1.1	335	6	CQ525988 Sequence
40	29	1.1	335	6	CQ525988 Sequence
41	29	1.1	336	6	CQ397251 Sequence
42	29	1.1	396	6	CQ403555 Sequence
43	29	1.1	396	6	AR391197 Sequence
44	29	1.1	396	6	AR392902 Sequence
45	29	1.1	396	6	AR489632 Sequence
46	29	1.1	396	6	AR493873 Sequence
47	29	1.1	396	6	AR093202 Sequence
48	29	1.1	574	6	AX381133 Sequence
49	29	1.1	1547	9	HA5408884 Homo sapi
50	29	1.1	183793	2	CR450793 Danio rer
51	29	1.1	190260	2	AC040991 Homo sapi
52	29	1.1	227369	2	CR538726 Danio rer
53	29	1.1	230637	2	AC095345 Rattus no
54	29	1.1	246991	2	AC122956 Rattus no
55	29	1.1	249173	2	AC135886 Rattus no
56	28	1.1	44	6	AR038858 Sequence
57	28	1.1	46	6	AX287579 Sequence
58	28	1.1	46	6	AX287583 Sequence
59	28	1.1	51	6	CQ005099 Sequence
60	28	1.1	54	6	A49113 Sequence 8
61	28	1.1	55	6	AR420154 Sequence
62	28	1.1	55	6	AX980848 Sequence
63	28	1.1	55	6	BD115707 EST and e
64	28	1.1	57	6	AX903958 Sequence
65	28	1.1	57	6	BD039491 Sequence
66	28	1.1	59	6	AR420379 Sequence
67	28	1.1	59	6	AX981073 Sequence
68	28	1.1	59	6	BD115932 EST and e
69	28	1.1	62	6	AX205290 Sequence
70	28	1.1	69	6	AR420390 Sequence
71	28	1.1	69	6	AR420957 Sequence
72	28	1.1	69	6	AX981084 Sequence
73	28	1.1	69	6	AX981651 Sequence
74	28	1.1	69	6	BD115943 EST and e
75	28	1.1	69	6	BD116510 EST and e
76	28	1.1	70	6	AR420943 Sequence
77	28	1.1	70	6	AX981637 Sequence
78	28	1.1	70	6	BD116496 EST and e
79	28	1.1	72	6	AR420892 Sequence
80	28	1.1	72	6	AX981587 Sequence
81	28	1.1	72	6	BD116446 EST and e
82	28	1.1	73	6	AR423201 Sequence
83	28	1.1	73	6	AX983895 Sequence
84	28	1.1	73	6	BD118754 EST and e
85	28	1.1	77	6	AR420769 Sequence
86	28	1.1	77	6	AX981463 Sequence
87	28	1.1	77	6	BD116322 EST and e
88	28	1.1	81	6	AR119865 Sequence
89	28	1.1	81	6	AR420701 Sequence
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[illegible]

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6	415	15.8	3562	3	US-09-360-197-1	Sequence 1, Appl1
7	391.2	14.9	1736	3	US-09-360-197-13	Sequence 13, Appl1
8	351	13.4	1602	3	US-09-360-197-9	Sequence 9, Appl1
9	347.2	13.2	1948	3	US-09-360-197-11	Sequence 11, Appl1
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11	335	12.8	1539	4	US-09-016-434-1102	Sequence 1102, Appl1
12	335	12.8	1666	3	US-09-360-197-5	Sequence 5, Appl1
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15	43.2	1.6	2218	2	US-08-845-998-5	Sequence 5, Appl1
16	43.2	1.6	2218	3	US-09-206-537-5	Sequence 5, Appl1
17	43.2	1.6	2218	3	US-09-430-854-5	Sequence 5, Appl1
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20	40.8	1.6	985	4	US-09-332-409-27	Sequence 27, Appl1
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1 Sequence 7, Application US/09518959
2 Patent No. 6548270
3
4 GENERAL INFORMATION:
5
6 APPLICANT: Dublin, Adrienne E
7
8 APPLICANT: Erlander, Mark G
9
10 APPLICANT: Huvar, Rene
11
12 APPLICANT: Pyati, Jayashree
13
14 TITLE OF INVENTION: DNA encoding human ac
15
16 TITLE OF INVENTION: channel BAC4 (ASIC4)
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18 FILE REFERENCE: CRT-1197
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20 CURRENT APPLICATION NUMBER: US/09/518,955
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22 CURRENT FILING DATE: 2000-03-03
23
24 NUMBER OF SEQ ID NOS: 9
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26 SOFTWARE: PatentIn Ver. 2.1
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28 SEQ ID NO 7
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32 TYPE: DNA
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34 ORGANISM: Homo sapiens
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36 US-09-518-959-7

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Matches 2131; Conservative	0;	Mismatches 353;	Indels 49;	Gaps 13

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GenCore version 5.1.6  
Copyright (c) 1993 - 2004 CompuGen Ltd.

OM nucleic - nucleic search, using sw model

Run on: December 20, 2004, 21:31:31 ; Search time 5273 Seconds

(without alignments)  
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Sequence: 1 agtgaacagctgcgcgggtgc.....aaaaaaaaaaaaaaaaa 2622

Scoring table: IDENTITY\_NUC

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Searched: 32822875 seqs, 18219865908 residues

Total number of hits satisfying chosen parameters: 65645750

Minimum DB seq length: 0

Maximum DB seq length: 200000000

Post-processing: Minimum Match 0%

Database : Listing first 45 summaries

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9: gb\_est9.\*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

# SUMMARIES

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3	695.8	26.5	724	5	BQ442411 UI-M-EV0-
4	669.2	25.5	690	5	BU709210 UI-M-EV0-
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6	641.2	24.5	779	5	EX345391 BX345391
7	613.8	22.4	633	5	BU058742 UI-M-FR0-
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## ALIGNMENTS

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LOCUS UI-M-FD0-cdg-a-19-0-UI-r1 NIH BMAP\_FDO Mus musculus cDNA clone  
DEFINITION IMAGE:6828284 5', mRNA sequence.

ACCESSION CA749777.1 GI:25572573  
VERSION CA749777.1  
KEYWORDS EST.  
SOURCE Mus musculus (house mouse)  
ORGANISM Mus musculus

REFERENCE NIH-MGC http://mgi.nci.nih.gov/  
AUTHORS National Institutes of Health, Mammalian Gene Collection (MGC)  
TITLE Unpublished (1999)  
JOURNAL  
COMMENT Contact: Robert Strausberg, Ph.D.  
Email: cgabbs-r@mail.nih.gov  
Tissue Procurement: Dr. James Lin, University of Iowa  
CDNA Library Preparation: Dr. M. Bento Soares, University of Iowa  
CDNA Library Arrayed by: Dr. M. Bento Soares, University of Iowa  
DNA Sequencing by: Dr. M. Bento Soares, University of Iowa  
Clone Distribution: MGC clone distribution information can be found through the I.M.A.G.E. Consortium/ILNL at:  
http://image.llnl.gov  
This clone was contributed by the Brain Molecular Anatomy Project (BMAP)

Seq primer: pYX-5  
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/strain="C57BL/6"  
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/clone\_lib="NIH BMAP\_FDO"  
/note="Organ: Brain; Vector: pYX-AAC; Site 1: Bcor I; Site 2: Not I; The library was constructed according to Bonaldo, Lennon and Soares, Genome Research, 6:791-806, 1996. Denatured mRNA was size fractionated on a 1% agarose gel. First strand cDNA synthesis was primed with an oligo-dT primer containing a Not I site. Double stranded cDNA was size selected according to mRNA size fraction, ligated with Bcor I adaptor, digested with Not I, and then

GenCore version 5.1.6  
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OM nucleic - nucleic search, using sw model

Run on: December 20, 2004, 17:12:06 ; Search time 816 Seconds

(without alignments)

16867.625 Million cell updates/sec

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Searched: 4134886 seqs, 2624710521 residues

Total number of hits satisfying chosen parameters: 8269772

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Minimum DB seq length: 0
Maximum DB seq length: 20000000000
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Post-processing: Minimum Match 0%
Maximum Match 100%
Listing first 45 summaries
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Database : N\_GeneSeq\_23Sep04:\*

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10: geneSeqn2003cs: *
11: geneSeqn2003ds: *
12: geneSeqn2004s: *

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Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

## SUMMARIES

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| 3      | 1834.2 | 70.0  | 2710  | 11    | ADN8971  |    | ADN8971  | Cancer/a    |
| 4      | 1816.6 | 69.3  | 2711  | 2     | AAV68056 |    | AAV68056 | Neurodege   |
| 5      | 1748   | 66.7  | 2528  | 5     | ADH18265 |    | ADH18265 | Human bra   |
| 6      | 1747.4 | 66.6  | 2752  | 12    | ADH22600 |    | ADH22600 | cDNA enc    |
| 7      | 1717   | 65.5  | 2431  | 6     | ABZ11576 |    | ABZ11576 | Human pol   |
| 8      | 1717   | 65.5  | 2431  | 12    | ADM44054 |    | ADM44054 | Novel hu    |
| 9      | 1555   | 59.3  | 2955  | 2     | AAV68057 |    | AAV68057 | Neurodege   |
| 10     | 1411.2 | 53.8  | 1632  | 2     | AAV68059 |    | AAV68059 | Neurodege   |
| 11     | 1199.4 | 45.7  | 2516  | 3     | AAAS9323 |    | AAAS9323 | DNA encod   |
| 12     | 951.8  | 36.3  | 1203  | 3     | AAAS9324 |    | AAAS9324 | Coding re   |
| 13     | 492.8  | 18.8  | 2962  | 2     | AAZ82161 |    | AAZ82161 | Rat Acid    |
| 14     | 491.2  | 18.7  | 3647  | 2     | AAV68042 |    | AAV68042 | Rat acid    |
| 15     | 491.2  | 18.7  | 3647  | 3     | AAZ61200 |    | AAZ61200 | cDNA        |
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| 45 | 344   | 13.1 | 1702 | 12 | ADP43822 |

## ALIGNMENTS

## RESULT

ID AAZ36802 standard; cDNA to mRNA; 2622 BP.

AC AAZ36802;

DT 13-MAR-2000 . (first entry)

DE Nucleic acid encoding a H<sup>+</sup>-gated cation channel designated SPASIC.

KM H+-gated cation channel; SPaCIC; dorsal root ganglion; gene therapy;  
KM acid sensitive cation channel; central nervous system; pain response;  
KM ion channel activity; neurotransmitter release; analgesic;  
KM neuromodulatory; anti-inflammatory; neurotransmitter release;  
KM neuronal excitability; ds.

OS *Rattus norvegicus*.

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| 100 | 100 | 100                 |

|    |     |            |
|----|-----|------------|
| FT | CDS | 293. .1912 |
|----|-----|------------|

FT / \*tag= a

FT /product= "H+-gated cation channel"

PN WO9963081-A2

PD 09-DEC-1999.

PF 03-JUN-1999; 99WO-GB001743.

PR 03-JUN-1998; 98GB-00011965.

PA (UNLO ) UNIV COLLEGE LONDON.

PI Wood JN, England S, Chen CC, Akopian AN

DR WPI; 2000-086977/07.

XX

PT identifying novel analgesic and antiinflammatory agents.

PS Claim 11; Page 48-51; 55pp; English.

**CC** The present sequence encodes a H<sup>+</sup>-gated cation channel, designated

